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EXAMINER

TUCKER, PHILIP C

| ART UNIT | PAPER NUMBER |
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1712

DATE MAILED: 05/07/2003

10

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

826127

Applicant(s)

NELSON ET AL

Examiner

P. TUCKER

Group Art Unit

1712

—The MAILING DATE of this communication appears on the cover sheet beneath the correspondence address—

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, such period shall, by default, expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).

Status

- ☒ Responsive to communication(s) filed on 4/21/03
- ☐ This action is **FINAL**.
- ☐ Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

Disposition of Claims

- ☒ Claim(s) 1-26, 29, 33-35, 37, 38, 41-50 is/are pending in the application.
- Of the above claim(s) _____ is/are withdrawn from consideration.
- ☒ Claim(s) 19, 20, 22, 23, 29, 33-35, 37 is/are allowed.
- ☒ Claim(s) 1, 2, 5, 6, 8, 11, 16-18, 24, 25, 26, 38, 41, 44, 49, 50 is/are rejected.
- ☒ Claim(s) 3, 4, 7, 9, 12-15, 21, 42, 43, 45-48 is/are objected to.
- ☐ Claim(s) _____ are subject to restriction or election requirement.

Application Papers

- ☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.
- ☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.
- ☐ The drawing(s) filed on _____ is/are objected to by the Examiner.
- ☐ The specification is objected to by the Examiner.
- ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119 (a)-(d)

- ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).
- ☐ All ☐ Some* ☐ None of the CERTIFIED copies of the priority documents have been received.
- ☐ received in Application No. (Series Code/Serial Number) _____
- ☐ received in this national stage application from the International Bureau (PCT Rule 1.7.2(a)).

*Certified copies not received: _____

Attachment(s)

- ☐ Information Disclosure Statement(s), PTO-1449, Paper No(s). _____
- ☒ Notice of Reference(s) Cited, PTO-892
- ☐ Notice of Draftsperson's Patent Drawing Review, PTO-948
- ☐ Interview Summary, PTO-413
- ☐ Notice of Informal Patent Application, PTO-152
- ☐ Other _____

Office Action Summary

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DETAILED ACTION

1. The final rejection of 3/12/03, paper no. 8 is hereby withdrawn and superseded by this present action. Applicants after final amendment has been entered.

Claim Objections

2. Claim 21 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form. Claim 21 fails to further limit parent claims 19 and 20..

3. Claims 42, 43, 48 are objected to because of the following informalities: In claims 42, line 4 and claim 43, line 5, after "injection", the period should be removed. In claim 48, it is believed that the term "., said breaking system" in line 5 should be deleted, in order to clarify the claim.. Appropriate correction is required.

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Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.


5. Claims 1, 2, 5, 6, 8, 11, 16-18, 24, 25, 26, 38, 41, 44, 49 and 50 are rejected under 35 U.S.C. 103(a) as being unpatentable over Vollmer (6432885 B1).

Vollmer teaches a fluid which is used in fracturing a formation which comprises an amphoteric viscoelastic surfactant and an acid forming compound (column 5, lines 6-33). The acid forming compound may be esters such as acetates, formates etc., which would form acids, and alcohols such as methanol and ethanol, upon hydrolysis of the ester in the fluid (column 3, line 61 - column 4, line 6). Vollmer differs from the present invention in that a specific example of using the acid forming compound is not disclosed. However, Vollmer teaches that the formulation comprising the acid-forming compound is particularly preferred (column 5, lines 6-15). It would thus be obvious to one of ordinary skill in the art to make the fracturing fluids of Vollmer, containing the acid forming compounds, such as esters, given the teaching of Vollmer that such fluids are particularly preferred for the use in fracturing operations.

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6. Claims 19, 20, 22, 23, 29, 33-35 and 37 are allowable over the art of record.
7. Claim 3, 4, 7, 9, 10, 12-15, 21, 42, 43, 45 and 48 objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. Claims 46 and 47 are dependent upon objected claim 42.
8. Applicants amendment has overcome the rejection over Chang. A new rejection is presented in this action.
9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Philip Tucker whose telephone number is (703) 308-0529. The examiner's normal working hours are 7:30am-4:00pm, Monday-Friday. If necessary SPE Robert Dawson may be contacted at 703-308-2340. For inquiries of a general nature call the receptionist at 703-308-0651. The group FAX no. is 703-872-9310. The **after final** fax no. Is 703-872-9311.

PCT-2647
May 1, 2003


PHILIP C. TUCKER
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